

## SEQUENCE LISTING

&lt;110&gt; Novartis AG

&lt;120&gt; OCULAR GENE THERAPY

&lt;130&gt; 4-32625

&lt;160&gt; 21

&lt;170&gt; FastSEQ for Windows Version 4.0

&lt;210&gt; 1

&lt;211&gt; 183

&lt;212&gt; PRT

&lt;213&gt; Human

&lt;400&gt; 1

His	Ser	His	Arg	Asp	Phe	Gln	Pro	Val	Leu	His	Leu	Val	Ala	Leu	Asn
1					5				10					15	
Ser	Pro	Leu	Ser	Gly	Gly	Met	Arg	Gly	Ile	Arg	Gly	Ala	Asp	Phe	Gln
						20			25					30	
Cys	Phe	Gln	Gln	Ala	Arg	Ala	Val	Gly	Leu	Ala	Gly	Thr	Phe	Arg	Ala
						35			40				45		
Phe	Leu	Ser	Ser	Arg	Leu	Gln	Asp	Leu	Tyr	Ser	Ile	Val	Arg	Arg	Ala
						50			55			60			
Asp	Arg	Ala	Ala	Val	Pro	Ile	Val	Asn	Leu	Lys	Asp	Glu	Leu	Leu	Phe
						65			70			75			80
Pro	Ser	Trp	Glu	Ala	Leu	Phe	Ser	Gly	Ser	Glu	Gly	Pro	Leu	Lys	Pro
						85			90			95			
Gly	Ala	Arg	Ile	Phe	Ser	Phe	Asp	Gly	Lys	Asp	Val	Leu	Arg	His	Pro
						100			105			110			
Thr	Trp	Pro	Gln	Lys	Ser	Val	Trp	His	Gly	Ser	Asp	Pro	Asn	Gly	Arg
						115			120			125			
Arg	Leu	Thr	Glu	Ser	Tyr	Cys	Glu	Thr	Trp	Arg	Thr	Glu	Ala	Pro	Ser
						130			135			140			
Ala	Thr	Gly	Gln	Ala	Ser	Ser	Leu	Leu	Gly	Gly	Arg	Leu	Leu	Gly	Gln
						145			150			155			160
Ser	Ala	Ala	Ser	Cys	His	His	Ala	Tyr	Ile	Val	Leu	Cys	Ile	Glu	Asn
						165			170			175			
Ser	Phe	Met	Thr	Ala	Ser	Lys									
						180									

&lt;210&gt; 2

&lt;211&gt; 551

&lt;212&gt; DNA

&lt;213&gt; Human

&lt;400&gt; 2

acagccacccg	cgacttccag	ccgggtgctcc	acctgggttc	gctcaacaggc	ccccctgtcag		60
gcggcatgcg	gggcatccgc	ggggccgact	tccagtgctt	ccagcaggcgc	ggggccgtgg		120
ggctggcggg	caccccccgc	gccttcctgt	cctcgccct	gcaggacctg	tacagcatacg		180
tgcgccgtgc	cgaccgcgcga	gccgtgccca	tgcgtcaacct	caaggacgag	ctgctgtttc		240
ccagctggga	ggctctgttc	tcaggctctg	agggtccgcgt	gaagccccggg	gcacgcattct		300
tctcctttga	cggcaaggac	gtcctgaggc	accccacctg	gccccagaag	agcgtgtggc		360
atggctcggg	cccccaacggg	cgcaggctga	ccgagagacta	ctgtgagacg	tggcggacgg		420
aggctccctc	ggccacgggc	caggcctct	cgctgctggg	gggcaggctc	ctggggcaga		480
gtgcccgcgag	ctgccccatcac	gcctacatcg	tgctctgcat	tgagaacagc	ttcatgactg		540
cctccaaatgt	g						551

&lt;210&gt; 3

<211> 207  
<212> PRT  
<213> Mouse

<400> 3  
Met Glu Thr Asp Thr Leu Leu Leu Trp Val Leu Leu Leu Trp Val Pro  
1 5 10 15  
Gly Ser Thr Gly Asp Ala Ala His Thr His Gln Asp Phe Gln Pro Val  
20 25 30  
Leu His Leu Val Ala Leu Asn Thr Pro Leu Ser Gly Gly Met Arg Gly  
35 40 45  
Ile Arg Gly Ala Asp Phe Gln Cys Phe Gln Gln Ala Arg Ala Val Gly  
50 55 60  
Leu Ser Gly Thr Phe Arg Ala Phe Leu Ser Ser Arg Leu Gln Asp Leu  
65 70 75 80  
Tyr Ser Ile Val Arg Arg Ala Asp Arg Gly Ser Val Pro Ile Val Asn  
85 90 95  
Leu Lys Asp Glu Val Leu Ser Pro Ser Trp Asp Ser Leu Phe Ser Gly  
100 105 110  
Ser Gln Gly Gln Leu Gln Pro Gly Ala Arg Ile Phe Ser Phe Asp Gly  
115 120 125  
Arg Asp Val Leu Arg His Pro Ala Trp Pro Gln Lys Ser Val Trp His  
130 135 140  
Gly Ser Asp Pro Ser Gly Arg Arg Leu Met Glu Ser Tyr Cys Glu Thr  
145 150 155 160  
Trp Arg Thr Glu Thr Thr Gly Ala Thr Gly Gln Ala Ser Ser Leu Leu  
165 170 175  
Ser Gly Arg Leu Leu Glu Gln Lys Ala Ala Ser Cys His Asn Ser Tyr  
180 185 190  
Ile Val Leu Cys Ile Glu Asn Ser Phe Met Thr Ser Phe Ser Lys  
195 200 205

<210> 4  
<211> 624  
<212> DNA  
<213> Mouse

<400> 4  
atggagacag acacactcct gctatggta ctgctgctct gggttccagg ttccactgg 60  
gacgcggccc atactcatca ggactttcag ccagtgtcctt acctgggtggc actgaacacc 120  
ccccctgtctg gaggcatgcg tggtatccgt ggagcagatt tccagtgtctt ccagcaagcc 180  
cgagccgtgg ggctgtcggg caccttcgg gctttcctgt cctcttaggct gcaggatctc 240  
tatagcatcg tgccgtgtgc tgaccgggg tctgtgccc tcgtcaacct gaaggacgag 300  
gtgctatctc ccagctggaa ctccctgttt tctggctccc agggtcaagt gcaacccggg 360  
gcccgcatct ttttttttga cggcagagat gtccctgagac acccagcctg gccgcagaag 420  
agcgtatggc acggctcggg ccccagtggg cggaggctga tggaggtta ctgtgagaca 480  
tggcgaactg aaactactgg ggctacaggt cagggctcct ccctgtgtc aggaggctc 540  
ctggaaacaga aagctgcgag ctggccacaac agctacatcg tcctgtgcat tgagaatagc 600  
ttcatgacct ctttctccaa atag 624

<210> 5

<211> 8  
<212> PRT  
<213> Human

<400> 5  
Ala Pro Gln Gln Glu Ala Leu Ala  
1 5

<210> 6

<211> 38  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 6  
actggtgacg cggccatac tcatacaggac tttcagcc 38

<210> 7  
<211> 32  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 7  
aagggctatc gatctagctg gcagaggcct at 32

<210> 8  
<211> 20  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 8  
cactgcttac tggcttatcg 20

<210> 9  
<211> 29  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 9  
ctgatgagta tggccgcgt caccagtgg 29

<210> 10  
<211> 32  
<212> DNA  
<213> Artificial Sequence

<220>

<223> PCR Primer

<400> 10  
aagggctatc gatctagctg gcagaggcct at 32

<210> 11  
<211> 35  
<212> DNA  
<213> Artificial Sequence

<220>

<223> PCR Primer

<400> 11  
gatctctaga ccaccatgca tactcatcg gactt

35

<210> 12  
<211> 30  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 12  
actggagaaa gaggtttatc tagctactag

30

<210> 13  
<211> 18  
<212> PRT  
<213> Adenovirus

<400> 13  
Met Arg Tyr Met Ile Leu Gly Leu Leu Ala Leu Ala Ala Val Cys Ser  
1 5 10 15  
Ala Ala

<210> 14  
<211> 96  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 14  
gatctctaga ccaccatgag gtacatgatt ttaggcttgc tcgcccttgc ggcagtctgc  
agcgcggccc atactcatac tcatacaggac ttccag

60

96

<210> 15  
<211> 29  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 15  
atcgatcata ctcatacaggaa ctttcagcc

29

<210> 16  
<211> 29  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 16  
gcggccgcct atttggagaa agaggtcat

29

<210> 17

<211> 23  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 17  
tttttttttc agtgtaaaag gtc 23

<210> 18  
<211> 19  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 18  
cagatgacat cctggccag 19

<210> 19  
<211> 22  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 19  
ctatacagga aagtatggca gc 22

<210> 20  
<211> 118  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 20  
gccaaagcttc catgagggcc tggatcttct ttctcctttg cctggccggg agggctctgg 60  
cagccccctca gcaagaagcg ctcgctcaca gccaccgcga cttccagccg gtgctcca 118

<210> 21  
<211> 123  
<212> DNA  
<213> Artificial Sequence

<220>  
<223> PCR Primer

<400> 21  
ccaggtggag caccggctgg aagtgcgcgt ggctgtgagc gagcgcttct tgctgagggg 60  
ctgccagagc cttccccggcc aggcaaagga gaaagaagat ccaggccctc atggaagctt 120  
ggc 123